# Welcome to HDE

## **ABOUT ESO**

The mission of ESO is to improve community health and safety through the power of data. ESO provides the industry's most reliable, user-friendly and innovative software and applications that are designed to meet the changing needs of EMS agencies, fire departments and hospitals across North America. Founded in 2004, ESO serves more than 14,000 departments and agencies.

ESO's hospital customers include facilities across the nation's largest healthcare systems: HCA, Community Health System (CHS), CHI, Ascension, Adventist, and others. We have successfully implemented nearly 200 interoperability projects with hospital platforms such as Epic, Cerner, AllScripts, Medhost, Meditech and others. To quote a currently popular insurance commercial, "we know a lot, because we have seen a lot."

ESO agencies create almost 3 million patient records each quarter. ESO's interoperability engine processes 1.3 million messages each week from our participating hospitals.

Centered on ESO's flagship product, ESO EHR, the ESO Software Suite delivers powerful reporting capabilities, unmatched ease of use, and operational tools to save time and improve the quality and accuracy of documentation. ESO's products offer intuitive features for field staff along with deep analytical capabilities and reporting metrics for administrators who need to report state and federal documentation.

#### **KEY MESSAGES**

- The ESO Health Data Exchange (HDE), is a first-of-its-kind interoperability platform connecting EMS and hospitals. HDE delivers the EMS patient care record (PCR) and discrete data to receiving facilities and returns demographic, billing and clinical outcome data to EMS.
- Bidirectional, agnostic data sharing
- View EMS data in real time
- Automate reporting to trauma, stroke and STEMI registries
- Received automated outcome data on every transport, including ED and inpatient diagnosis, procedures, vital signs, lab values and disposition
- Enable faster reimbursement with ESO Payer Insight



## Welcome to HDE

## **CORE BENEFITS**

- Timely QA feedback for hospital staff and EMS
- Improved relationships with local EMS agencies
- Understand hospital outcomes versus EMS diagnosis
- Develop core metrics for reporting with HDE's Analytics capabilities
- Extract trends overtime to improve operational efficiencies
- Know volume by service line and/or EMS agency
- Support research, provider knowledge and system improvements with closed loop data

## **ARTICLES**

#### **EMS1 WORLD 2014 INNOVATION AWARDS**

https://www.emsworld.com/article/12031675/innovation-awards

## **USING HDE TO CONNECT TO A STATE HIE**

Presented at EMS World Expo Data & Technology Summit, 2017:

https://vimeo.com/240727716

CHILDREN'S MERCY PARTNERS WITH CERNER, ESO SOLUTIONS AND THE KANSAS CITY FIRE DEPARTMENT TO IMPROVE THE CAPTURE OF PATIENT INFORMATION (2017):

https://www.childrensmercy.org/news/childrens-mercy-partners-with-cerner-eso-solutions-and-the-kansas-city-fire-department-to-improve-the-capture-of-patient-information/

# **TESTIMONIALS**

"As simple as it sounds, one of the biggest benefits that HDE offers is access to the EMS chart. In the past, they never seemed to make it into the medical record." "I love having HDE in the hospital because in minutes I have the full EMS report populated in our system and incredibly easy to find – especially for those patients who get 'red doored,' aka dropped off in Triage."



JOHN WILMAS
MD, FACEP, MEDICAL DIRECTOR
MERCY HOSPITAL
ST. LOUIS, MISSOURI



AVERY THORNHILL DO, EMERGENCY PHYSICIAN LSU MEDICAL CENTER SHREVEPORT, LOUISIANA



# HDE: Core Benefits

ESO HDE can benefit everyone within your team. Here, we call out a few roles which see specific benefits from implementing HDE.

UNIT SECRETARY	Reduce the need for printing facesheets with automated data flow	Save time on searching for records or receiving faxed documents
NURSING STAFF	Easily reference the EMS record in the EHR – no more searching	Avoid transcription errors that may affect patient safety
PHYSICIANS	Review the EMS record in the EHR for continuity of care and risk mitigation	Quickly identify pre-hospital medications given, conditions present and more
SPECIALTY CARE COORDINATORS	The EMS record at your fingertips to support registry and quality review efforts	Increase outcome data to EMS with automated reporting
HOSPITAL ADMINISTRATORS	Review referral patterns - receive insight into volume by service line and/ or EMS agency	Demonstrate support for EMS with a quality oriented alignment strategy
TRANSPORTING MEDICS	Learn outcomes for all transported patients	Ease of transmission of patient care information – no more printing or faxing
QA/EMS ADMINISTRATOR	Receive timely QA feedback for hospital transports	Compare hospital outcomes versus EMS impressions
BILLING	Receive best demographic information to assure rapid, appropriate billing	Receive clinical outcome data to support the appeal's process



# **Metrics for Hospital and EMS Success with HDE**

When getting started with ESO HDE, you'll want to use these baseline metrics to understand performance with both your hospital and EMS teams. The measures below should be accomplished 30 days post-go live. Your ESO Customer Success Manager will walk you through the metrics in more detail so you can create a game plan for achieving the listed metrics.

## **HOSPITAL**

## **EMS**

## **AWARENESS**

- ED Physicians and Nurses know where to locate the EMS record
- ED Physicians are consulting the EMS record
- Triage Desk staff can direct EMS staff on what number to scan
- Visual reminders are in place in the EMS lounge, Triage desk or other specified location
- EMS crews can demonstrate scanning the encounter number into the correct field.
- EMS crews can demonstrate accessing the outcome report
- EMS Medical Director and Quality staff demonstrate accessing HDE analytics reports
- Visual reminders are in place in the EMS station

#### **MONITORING**

- 50% scan compliance from phase 1 targeted agencies
- EMS liaison can demonstrate how to access scan report to determine scan rate by agency
- Meeting held to provide feedback to phase 1 targeted agencies, improvement plan in place if needed.
- Top performers recognized by hospital

- 50% scan compliance for HDE enabled facilities
- EMS stakeholder can demonstrate how to access scan report to determine scan rate by facility
- Meeting held with participating facilities, improvement plan in place if needed.
- Top performers recognized by agency
- All staff provided with scan performance report.

## **SERVICE LINE METRICS**

- Staff can access Hospital Reports for their respective service line
- Staff can execute report and modify dates, filters and access individual records
- Staff can demonstrate accessing PCR in hospital EHR and Patient Tracker

## QA

• QA staff can demonstrate use of the Diagnosis Comparison Reports

#### **SHARING**

- Hospital provides EMS with one ROI success story that HDE has provided (i.e. enabled true volume report, reduced time to locate chart, MD seeing records 70% of cases)
- EMS provides the hospital and EMS staff with one interesting finding from the outcomes data (90% correlation of STEMI diagnosis to EMS primary impression)



# CHILDREN'S MERCY PARTNERS WITH CERNER, ESO SOLUTIONS AND THE KANSAS CITY FIRE DEPARTMENT TO IMPROVE THE CAPTURE OF PATIENT INFORMATION

#### **SEPT 2017**

http://news.childrensmercy.org/childrens-mercypartners-with-cerner-eso-solutionsandthe-kansas-city-fire-department-to-improve-thecapture-of-patient-information/

When a child is sick or injured, the care that local EMTs and paramedics provide can mean the difference between life and death. But the critical information that local first responders gather in the field or during transport doesn't always make it into the hands of hospital caregivers in a timely and efficient manner.

But that's all changing, thanks to an innovation through which Children's Mercy will integrate its electronic health record (EHR) system into the documentation systems local EMS agencies use for capturing patient information in the field.

"The Kansas City metropolitan area is leading the country when it comes to integrating prehospital and hospital care," says Children's Mercy Chief Medical Information Officer Laura Fitzmaurice, MD.

"By streamlining the way we communicate and share data with first responders in the region, we're advancing the already world-class care we provide for our pediatric patients at Children's Mercy," she adds.

"Integrating the data systems not only helps hospital clinicians improve bedside decision-making - it also helps fire departments and EMS agencies provide better care," says Tom Collins, Deputy Chief for the Kansas City (Mo.) Fire Department.



"First responders often treat and transport patients without ever learning the outcome of their efforts," Collins says. "The ability for our EMTs and paramedics to receive feedback on the hospital outcomes for their patients will give us the information we need to learn, grow and enhance the way we take care of patients. It's a big win for prehospital pediatric care in the Kansas City region."

Children's Mercy is partnering with ESO Solutions, a leading healthcare data company based in Austin, Texas, and locally based EHR leader Cerner to help make the integration become reality. The project went live in early August and is already showing extreme success.

